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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/679,607	10/06/2003	Jalme Grady Jurens	200400266-1	3301

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HEWLETT-PACKARD COMPANY
Intellectual Property Administration
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EXAMINER

LIANG, LEONARD S

ART UNIT	PAPER NUMBER
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2853

DATE MAILED: 03/22/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/679,607

Applicant(s)

JURRENS ET AL.

Examiner

Leonard S. Liang

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 12 January 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3 and 6-17 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3 and 6-17 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 06 October 2003 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date 10/06/03.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: _____.

DETAILED ACTION

Election/Restrictions

The examiner has vacated the applicant's response to the election/restriction requirement filed on 07/25/05. In response to the applicant's current response filed on 01/12/06, the examiner accepts the applicant's amendments. The examiner will hereby examine all pending claims, that is, claims 1, 3, and 6-17.

Drawings and Specification

The drawings are objected to because of the following minor informalities.

- The specification refers to reference 118 as a TTO coating that's applied to the substrate, but figure 1 shows reference 118 to be on the bottom side of the overcoat sheet. The examiner assumes that the coating should be on the top side of the sheet.
- In figure 2, the sheet is referred to by both references 106 and 106'. The examiner wonders whether it was deliberate to label the same sheet using two different reference numbers.
- In figure 3, there is a reference 2021, which was not found in the specification.
- In figure 5, reference 106' is not pointing to anything.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing

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should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Objections

Claim 15 is objected to because of the following informalities: Currently amended claim 15 is still dependent on claim 15. It will be assumed that this should have been corrected to have newly amended claim 15 dependent on newly amended claim 14 instead. Appropriate correction is required.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 9 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the

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invention. Specifically, claim 9 discloses a "printed roll." There is no mention of a printed roll in claim 8. The examiner cannot ascertain whether the printed roll is meant to refer to the heating roll or the backing roll.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1, 3, 6-8, and 10-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Pearson (US Pat 6089703) in view of Arcaro et al (US Pat 6902643).

Pearson discloses:

- {claim 1} A printing device (figure 1); a heated roll (figure 1, reference 28); a first transport mechanism that moves a printed side of a printed medium against the heated roll (figure 1, reference 22); a backing roll that forms a nip with the heated roll (figure 1, reference 30); a second transport mechanism that moves the printed medium to the nip such that the printed medium passes through the nip (figure 1, reference 32)
- {claim 7} wherein the second transport mechanism includes a duplexer or paper-inverting mechanism (figure 1, reference 46; roll 32 is transporting inverted paper)

- {claim 8} a heated roll (figure 1, reference 28); a backing roll that forms a nip with the heated roll (figure 1, reference 30); a transport mechanism that moves the printed medium through the nip and a first side of a printed medium against the heated roll (figure 1, reference 32); the second side of the printed medium including printed ink (figure 1, reference 46; note that the second side here corresponds to the printed side in claim 1)
- {claim 11} a guidance mechanism that guides the printed medium path prior to entering the nip (figure 1, reference 20)
- {claim 14} providing a printed medium including a first side and a second side (figure 1); a heated roll (figure 1, reference 28), and a backing roll (figure 1, reference 30), wherein the heated roll and backing roll form a nip through which the printed medium travels (figure 1, reference 40); transporting the printed medium to a nip formed between a heated roll and a backing roll such that the heated roll heats the first side of the printed medium (figure 1, reference 45)
- {claim 17} wherein the printed medium is in a substantially non-heated state prior to thermal contact with the heated roller (figure 1, reference 36)

Pearson differs from the claimed invention in that it does not disclose:

- {claim 1} a means for supplying a separate sheet to the nip; the overcoat sheet is fused to the printed side of the printed media
- {claim 3} wherein the backing roll is heated or otherwise provides energy or heat
- {claim 6} wherein the separate sheet is a thermal transfer overcoat sheet, laminate, film sheet, or substantially continuous web

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- {claim 8} A device for supplying an overcoat sheet to a printed medium; a supply mechanism that provides a separate overcoat sheet to the second side of the printed medium at or adjacent the nip, wherein the overcoat sheet is fused or attached to the second side of the printed medium at least in part by the heat provided from the heated roll
- {claim 10} wherein the backing roll is heated or otherwise provides energy or heat
- {claim 12} wherein the printed ink associated with the second side of the printed medium is dried and the overcoat sheet is applied together in one heating step by the heating roll and the backing roll
- {claim 13} wherein the overcoat sheet is a thermal transfer overcoat sheet or a substantially continuous web
- {claim 14} A method for applying a sheet to a printed medium; an overcoat sheet; providing a separate overcoat sheet to the second side of the printed medium at or adjacent the nip, the second side of the printed medium including printed ink; drying the printed ink and attaching or fusing the overcoat sheet to the second side of the printed medium
- {claim 15} the removal of a portion of the overcoat material or sheet
- {claim 16} wherein the backing roll is heated or otherwise provides energy or heat

Arcaro et al discloses:

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- {claim 1} a means for supplying a separate sheet to the nip (figure 4, reference 107)
- {claim 3} wherein the backing roll is heated or otherwise provides energy or heat (figure 4, reference 105)
- {claim 6} wherein the separate sheet is a thermal transfer overcoat sheet, laminate, film sheet, or substantially continuous web (abstract)
- {claim 8} A device for supplying an overcoat sheet to a printed medium (figure 4); a supply mechanism that provides a separate overcoat sheet to the second side of the printed medium at or adjacent the nip (figure 4, reference 109, 115),
- {claim 10} wherein the backing roll is heated or otherwise provides energy or heat (figure 4, reference 105; the heated roller 105 in Arcaro et al would take the positional place of backing roller 30 in Pearson)
- {claim 13} wherein the overcoat sheet is a thermal transfer overcoat sheet or a substantially continuous web (abstract)
- {claim 14} A method for applying a sheet to a printed medium (figure 4); an overcoat sheet (figure 4, reference 107); providing a separate overcoat sheet to the second side of the printed medium at or adjacent the nip (figure 4, reference 107), the second side of the printed medium including printed ink
- {claim 15} the removal of a portion of the overcoat material or sheet (figure 4, reference 111)
- {claim 16} wherein the backing roll is heated or otherwise provides energy or heat (figure 4, reference 105)

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It would have been obvious to one having ordinary skill in the art at the time the invention was made to incorporate the teachings of Arcaro et al into the invention of Pearson. The motivation for the skilled artisan in doing so is to gain the benefit of protecting the paper with a thermal overcoat sheet. The combination naturally suggests:

- {claim 1} the overcoat sheet is fused to the printed side of the printed media
- {claim 8} wherein the overcoat sheet is fused or attached to the second side of the printed medium at least in part by the heat provided from the heated roll
- {claim 12} wherein the printed ink associated with the second side of the printed medium is dried and the overcoat sheet is applied together in one heating step by the heating roll and the backing roll
- {claim 14} drying the printed ink and attaching or fusing the overcoat sheet to the second side of the printed medium

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Jones et al (US Pat 5927189) discloses a method and apparatus for thermal fusing with two textured endless belts.

Sugaya et al (US Pat 6820975) discloses an inkjet recording apparatus and inkjet recording method.

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Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leonard S. Liang whose telephone number is (571) 272-2148. The examiner can normally be reached on 8:30-5 Monday-Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Stephen Meier can be reached on (571) 272-2149. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

03/18/06

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MANISH S. SHAH
PRIMARY EXAMINER

3/29/06